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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-----------------------------|-------------|----------------------|-----------------------|------------------|
| 10/572,823 | 09/22/2006 | Colin Brown | 102790-210 (30088 US) | 4910 |
| 27389 | 7590 | 10/02/2007 | EXAMINER | |
| NORRIS, MCLAUGHLIN & MARCUS | | | CONLEY, SEAN EVERETT | |
| 875 THIRD AVE | | | ART UNIT | PAPER NUMBER |
| 18TH FLOOR | | | 1744 | |
| NEW YORK, NY 10022 | | | | |

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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

| | | | |
|------------------------------|------------------------|---------------------|--|
| Office Action Summary | Application No. | Applicant(s) | |
| | 10/572,823 | BROWN ET AL. | |
| | Examiner | Art Unit | |
| | Sean E. Conley | 1744 | |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 3/22/06 and 9/22/06.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-7 is/are pending in the application.
 - 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-7 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 3/22/2006 is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

| | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____. |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>3/22/06</u> | 6) <input type="checkbox"/> Other: _____. |

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1, 3 and 7 are rejected under 35 U.S.C. 102(b) as being anticipated by Zelenka (U.S. Patent No. 2,764,789).

Regarding claim 1, Zelenka discloses a device adapted to disseminate vaporous material (liquid deodorant or disinfectant from container (8)) into an atmosphere by means of forced ventilation (air flow from fan (20)) acting on an evaporation surface (planar surface of the wick formed of absorbent fabric (28) and in contact with the metal disk (29)) supplied with a liquid volatile material that is vaporized (see col. 1, line 35 to col. 2, line 70). The evaporation surface (surface of the wick in contact with the metal disk (29)) is essentially planar and has an orientation generally parallel to the direction of the forced ventilation (this orientation is shown in figures 2-3).

Regarding claim 3, Zelenka discloses an evaporation surface which is the surface of the wick formed from a web of absorbent fabric (28). Since the evaporation surface is a web of absorbent fabric and porous, it inherently contains a series of very small wavelike surface contours which are also known as undulations (see col. 2, lines 37-43).

Regarding claim 7, Zelenka disclose a method of disseminating into an atmosphere a volatile liquid (liquid deodorant or disinfectant from container (8)) whose presence is desired there, comprising: (a) the provision of a gas flow into the atmosphere (flow created by fan (20)); (b) the location of an essentially planar evaporation surface (surface of wick formed from absorbent fabric (28) and the metal disk (29)) in relation to the gas flow, such that the flow is across the surface and essentially parallel to it (this orientation is shown in figures 2-3); and (c) the provision to the evaporation surface of a supply of volatile liquid (the absorbent fabric (28) wicks the volatile liquid from the container (8) to the evaporation surface) (see col. 1, line 15 to col. 3, line 43; see figures 2-3).

3. Claims 1, 2 and 5 are rejected under 35 U.S.C. 102(b) as being anticipated by Dimacopoulos (U.S. Patent No. 4,173,604).

Regarding claim 1, Dimacopoulos disclose a device (10) adapted to disseminate vaporous material (vapor generating liquid (48) provided in receptacle (28)) into an atmosphere by means of forced ventilation (air flow from fan (20)) acting on an evaporation surface (surface of member (38) completely saturated with the vapor generating liquid (48)) supplied with a liquid volatile material that is vaporized thereby, the evaporation surface being essentially planar (surface of member (38) is horizontal and planar) and having an orientation generally parallel to the direction of the forced ventilation that exits through outlets (16) (see figures 1, 2, 4 and 5; see col. 4, line 25 to col. 6, line 65).

Regarding claim 2, Dimacopoulos discloses an evaporation surface (surface of member (38) completely saturated with the vapor generating liquid (48)) that is generally horizontal and located beneath the flow of forced ventilation which is generated by fan (20) (see col. 6, lines 49-68; see figures 2, 4 and 5).

Regarding claim 5, Dimacopoulos discloses a device (10) adapted to disseminate vaporous material into an atmosphere, comprising the following elements:

(a) an electrically-driven fan (20), fitted with a housing (12) that is constructed so that the fan blows a current of air horizontally through an exit port (16) into the atmosphere (see figures 1-2; see col. 4, lines 35-60); (b) a reservoir (28) of volatile liquid (48) for evaporation into the atmosphere, the reservoir (28) having an upper orifice substantially completely blocked by an essentially planar, essentially horizontal evaporation surface (surface of absorbent member (38)), reservoir (28) and housing (12) cooperating such that the current of air blows across the evaporation surface (surface of absorbent member (38)) as it moves towards the exit port (16) (see figures 4-5; see col. 5, lines 10-55); and (c) means (liquid transport means (50)) for transferring liquid from the reservoir(28) to the evaporation surface (see figures 4-5; see col. 5, line 10 to col. 6, line 65).

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

5. Claims 4 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Zelenka as applied to claim 1 above, and further in view of Nakoneczny (U.S. Patent No. 5,857,620).

Zelenka discloses the claimed invention as stated above and further including a planar evaporation surface that includes at least one flat vane (formed by the extended portions of the absorbent member (28) that are draped over metal disk (29) and hanging

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vertically). These extensions are essentially perpendicular to the evaporation surface that is in contact with the metal disk (29). Additionally, the vanes (formed by the extended portions of the absorbent member (28) that are draped over metal disk (29) and hanging vertically) are capable of being rotated from a position parallel to the gas flow to a flow blocking position transverse to the flow by rotating the metal disk (29) (see figures 2-3; see col. 2, lines 37-65). Zelenka does not disclose vanes that are raised from the evaporation surface.

Nakoneczny discloses a liquid dispenser with an integral wick/emanator assembly. The wick/emanator assembly (14) includes a wick (16) that extends into a fluid reservoir (10) and an emanator (18) that is integrally formed with wick (16) and is raised from the surface of the wick (16) (see figure 1). The emanator (18) absorbs liquid from the wick (16) by capillary action (see col. 2, lines 29-49) and further provides an evaporative surface to dispense the liquid conducted from the reservoir (see col. 1, lines 53-61). The emanator provides enhanced control of the dispensing rate of the liquid by adjusting the surface area of the emanator (18) to provide a greater or lesser dispensing rate as desired (see col. 2, lines 50-61).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the device of Zelenka and add a flat emanator that is integrally formed to the top of the wick as taught by Nakoneczny in order to provide the user with enhanced control in the rate of dispensing by varying the surface area and size of the emanator. Furthermore, the emanator would also function as a

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vane that is capable of being rotated from a position parallel to the gas flow to a flow blocking position transverse to the flow by rotating the metal disk (29) of Zelenka.

Conclusion

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sean E. Conley whose telephone number is 571-272-8414. The examiner can normally be reached on M-F 8:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Gladys Corcoran can be reached on 571-272-1214. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Sean E. Conley



September 27, 2007